

AMENDMENTS TO THE CLAIMS

Claims pending

- At time of the Action: Claims 1-37.
- After this Response: Claims 1-37

Canceled or Withdrawn claims: 31-37

Amended claims: None

New claims: None

1. **(Original)** A substrate suitable for printing a toner image thereon,
comprising:

printing media;

an overlayer coating, having an outer surface to which a toner image can be
fused and fixed, the overlayer coating comprising an overlay polymer chosen from
the group consisting of ethylene acrylic acid copolymer, polyvinyl pyridine and
styrene butadiene copolymer,

wherein the overlayer is one or both of substantially free of particulate
matter and substantially wax and pigment free.

2. **(Original)** A substrate according to claim 1 wherein the overlayer is
substantially free of particulate matter.

3. **(Original)** A substrate according to claim 1 wherein the overlayer is
substantially wax and pigment free.

1 4. **(Original)** A substrate according to claim 3 wherein the overlayer is
2 substantially free of particulate matter.

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4 5. **(Original)** A substrate according to claim 1 wherein the printing
5 media is paper.

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7 6. **(Original)** A substrate according to claim 1 wherein the printing
8 media is plastic.

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10 7. **(Original)** A substrate according to claim 6 wherein the plastic is
11 polyethylene.

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13 8. **(Original)** A substrate according to claim 6 wherein the plastic is
14 vinyl.

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16 9. **(Original)** A substrate according to claim 6 wherein the plastic is
17 polycarbonate.

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19 10. **(Original)** A substrate according to claim 6 wherein the plastic is
20 polyethylene terephthalate (PET).

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22 11. **(Original)** A substrate according to claim 6 wherein the plastic is
23 BOPP (biaxially oriented polypropylene film).

1 12. **(Original)** A substrate according to claim 1 and including an
2 underlayer coating between the overlayer and the printing media, the underlayer
3 coating providing enhanced adhesion of the overlayer to the media.

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5 13. **(Original)** A substrate according to claim 13 wherein the underlayer
6 comprises amine terminated polyamide.

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8 14. **(Original)** A substrate according to claim 13 wherein the underlayer
9 comprises amino propyl triethoxy silane or reaction products of amino propyl
10 triethoxy silane.

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12 15. **(Original)** A substrate according to claim 13 wherein the underlayer
13 has a weight of between 0.1 and 1 grams per square meter.

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15 16. **(Original)** A substrate according to claim 15 wherein the underlayer
16 has a weight of between about 0.3 and 0.5 grams per square meter.

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18 17. **(Original)** A substrate according to claim 1 wherein the underlayer
19 is free of particulate matter.

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21 18. **(Original)** A substrate according to claim 13 consisting of only two
22 coating layers.

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24 19. **(Original)** A substrate suitable for printing a toner image thereon,
25 comprising:

1 paper printing media;

2 an overlayer coating, having an outer surface to which a toner image can be
3 fused and fixed, the coating comprising a overlayer polymer chosen from the
4 group consisting of ethylene acrylic acid copolymer, polyvinyl pyridine and
5 styrene butadiene copolymer.

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7 20. **(Original)** A substrate according to claim 1 or claim 19 wherein the
8 overlayer comprises styrene butadiene copolymer.

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10 21. **(Original)** A substrate according to claim 1 or claim 19 wherein the
11 overlayer comprises ethylene acrylic acid copolymer.

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13 22. **(Original)** A substrate according to claim 21 wherein the ethylene
14 acrylic acid copolymer has an acrylic acid comonomer percentage weight of
15 between 8% and 18%.

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17 23. **(Original)** A substrate according to claim 21 wherein the ethylene
18 acrylic acid copolymer has an acrylic acid comonomer percentage weight of
19 between 12% than 16%.

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21 24. **(Original)** A substrate according to claim 22 wherein the acidity of
22 the copolymer has been reduced.

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24 25. **(Original)** A substrate according to claim 24 wherein the acidity of
25 the copolymer has been reduced by saponification.

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2 26. **(Original)** A substrate according to claim 1 or claim 19 wherein the
3 overlayer comprises polyvinyl pyridine.
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5 27. **(Original)** A substrate according to claim 1 or claim 19 wherein the
6 overlayer has a weight of between 0.1 and 10 grams per square meter.
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8 28. **(Original)** A substrate according to claim 27 wherein the overlayer
9 has a weight of between 0.2 and 2 grams per square meter.
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11 29. **(Original)** A substrate according to claim 28 wherein the overlayer
12 has a weight of between about 0.25 and about 0.35 grams per square meter.
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14 30. **(Original)** A substrate according to claim 19 and including an
15 underlayer coating between the overlayer and the substrate, the underlayer coating
16 providing enhanced adhesion of the overlayer to the substrate.
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18 31. **(Withdrawn)** A method of producing a coated substrate which a
19 toner image can be adhered comprising:

20 providing a printing media; and

21 overcoating the media with an overlayer coating, the overlayer coating
22 comprising a second polymer material and having an outer surface to which a
23 toner image can be fused and fixed, the second polymer comprising a polymer
24 chosen from the group consisting of ethylene acrylic acid copolymer, polyvinyl
25 pyridine and styrene butadiene copolymer,

1 wherein the overlayer coating is one or both of substantially wax and
2 pigment free or substantially free of particulate matter.

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4 32. **(Withdrawn)** A method of producing a coated substrate which a
5 toner image can be adhered comprising:

6 providing a paper substrate; and

7 coating the paper substrate with an overlayer coating, the overlayer coating
8 comprising a polymer material and having an outer surface to which a toner image
9 can be fused and fixed, the polymer material comprising a polymer chosen from
10 the group consisting of ethylene acrylic acid copolymer, polyvinyl pyridine and
11 styrene butadiene copolymer.

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13 33. **(Withdrawn)** A printing method comprising:

14 providing a substrate according to claim 1 or claim 19; and

15 printing a toner image on the substrate.

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17 34. **(Withdrawn)** A printing method according to claim 33 wherein the
18 toner image is a liquid toner image.

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20 35. **(Withdrawn)** A printing method according to claim 34 wherein
21 printing comprises transferring the toner image to the substrate using heat and
22 pressure.

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24 36. **(Withdrawn)** A printing method according to claim 33 wherein
25 printing comprises electrostatically transferring the toner image to the substrate.

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2 37. (Withdrawn) A printing method according to claim 33 and
3 comprising:

4 forming the image on an image forming surface;

5 transferring the image from the image forming surface to an intermediate
6 transfer member; and

7 transferring the image from the intermediate transfer member to the
8 substrate.
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